



INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT

We make Indiana a cleaner, healthier place to live.

Joseph E. Kernan
Governor

Lori F. Kaplan
Commissioner

February 2, 2004

100 North Senate Avenue
P.O. Box 6015
Indianapolis, Indiana 46206-6015
(317) 232-8603
(800) 451-6027
www.in.gov/idem

TO: Interested Parties / Applicant

RE: Perry Chemical & Manufacturing Co., Inc. / MSOP 157-18141-00080

FROM: Paul Dubenetzky
Chief, Permits Branch
Office of Air Quality

Notice of Decision: Approval - Effective Immediately

Please be advised that on behalf of the Commissioner of the Department of Environmental Management, I have issued a decision regarding the enclosed matter. Pursuant to IC 13-15-5-3, this permit is effective immediately, unless a petition for stay of effectiveness is filed and granted according to IC 13-15-6-3, and may be revoked or modified in accordance with the provisions of IC 13-15-7-1.

If you wish to challenge this decision, IC 4-21.5-3 and IC 13-15-6-1 require that you file a petition for administrative review. This petition may include a request for stay of effectiveness and must be submitted to the Office of Environmental Adjudication, 100 North Senate Avenue, Government Center North, Room 1049, Indianapolis, IN 46204, **within eighteen (18) calendar days of the mailing of this notice**. The filing of a petition for administrative review is complete on the earliest of the following dates that apply to the filing:

- (1) the date the document is delivered to the Office of Environmental Adjudication (OEA);
- (2) the date of the postmark on the envelope containing the document, if the document is mailed to OEA by U.S. mail; or
- (3) The date on which the document is deposited with a private carrier, as shown by receipt issued by the carrier, if the document is sent to the OEA by private carrier.

The petition must include facts demonstrating that you are either the applicant, a person aggrieved or adversely affected by the decision or otherwise entitled to review by law. Please identify the permit, decision, or other order for which you seek review by permit number, name of the applicant, location, date of this notice and all of the following:

- (1) the name and address of the person making the request;
- (2) the interest of the person making the request;
- (3) identification of any persons represented by the person making the request;
- (4) the reasons, with particularity, for the request;
- (5) the issues, with particularity, proposed for considerations at any hearing; and
- (6) identification of the terms and conditions which, in the judgment of the person making the request, would be appropriate in the case in question to satisfy the requirements of the law governing documents of the type issued by the Commissioner.

If you have technical questions regarding the enclosed documents, please contact the Office of Air Quality, Permits Branch at (317) 233-0178. Callers from within Indiana may call toll-free at 1-800-451-6027, ext. 3-0178.

Enclosures
FNPER.dot 9/16/03



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**NEW SOURCE CONSTRUCTION PERMIT
and MINOR SOURCE OPERATING PERMIT
OFFICE OF AIR QUALITY**

**Perry Chemical & Manufacturing Company, Inc.
2335 South 30th Street
Lafayette, Indiana 47903-6419**

(herein known as the Permittee) is hereby authorized to construct and operate subject to the conditions contained herein, the emission units described in Section A (Source Summary) of this permit.

This permit is issued to the above mentioned company under the provisions of 326 IAC 2-1.1, 326 IAC 2-6.1 and 40 CFR 52.780, with conditions listed on the attached pages.

Operation Permit No.: MSOP 157-18141-00080	
Issued by:Original signed by Paul Dubenetzky Paul Dubenetzky, Branch Chief Office of Air Quality	Issuance Date: February 2, 2004 Expiration Date:February 2, 2009

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SECTION A

SOURCE SUMMARY

This permit is based on information requested by the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ). The information describing the source contained in conditions A.1 through A.3 is descriptive information and does not constitute enforceable conditions. However, the Permittee should be aware that a physical change or a change in the method of operation that may render this descriptive information obsolete or inaccurate may trigger requirements for the Permittee to obtain additional permits or seek modification of this permit pursuant to 326 IAC 2, or change other applicable requirements presented in the permit application.

A.1 General Information [326 IAC 2-5.1-3(c)] [326 IAC 2-6.1-4(a)]

The Permittee owns and operates a stationary flexible polyurethane foam casting plant.

Authorized Individual: John W. Carr, General Manager
Source Address: 2335 South 30th Street, Lafayette, Indiana 47903
Mailing Address: P.O. Box 6419, Lafayette, Indiana 47903-6419
General Source Phone: (765) 474-3404
SIC Code: 3086
County Location: Tippecanoe
Source Location Status: Attainment for all criteria pollutants
Source Status: Minor Source Operating Permit
Minor Source, under PSD Rules;
Minor Source, Section 112 of the Clean Air Act
Not 1 of 28 Source Categories

A.2 Emissions Units and Pollution Control Equipment Summary

This stationary source is approved to construct and operate the following emissions units and pollution control devices:

- (a) Five (5) two component, polyurethane foam machines, identified as Unit ID Nos. 1, 2, 3, 4, and 5, each constructed in 1984 (Unit #1), 1989 (Unit #5), 1991 (Units #2 and #3) and February 23, 1989 (Unit #4), each with a maximum production rate of 3,873 pads per day, each exhausting through one (1) stack ID #4 (Unit #5), ID #5 (Unit #1), ID #7 (Units #2 and #3), and ID #19 (Unit #4);
- (b) Two (2) two component, polyurethane foam machines, used in product development, identified as Unit ID Nos. 6 and 7, each constructed in 1992 and 1989, respectively, each with a maximum production rate of 100 pads per day, each exhausting through one (1) stack ID #13;
- (c) One (1) two component, polyurethane foam machine, identified as Unit ID #14, constructed in 1998, with a maximum production rate of 3,873 pads per day, exhausting through one (1) stack ID #20;
- (d) One (1) two component, elastomeric foam machine, identified as Unit ID #16, constructed in February 11, 1998, with a maximum production rate of 1731 pads per day, exhausting through one (1) stack ID #9;
- (e) One (1) automated hub assembly, identified as Unit ID #8, constructed in 1995, with a maximum usage rate of 1.33 pounds of adhesive per hour, exhausting to general ventilation (GV);
- (f) One (1) fabric roller coater, identified as Unit ID #9, used for the application of sealant to hook fabric products, constructed on November 7, 1985, with a maximum usage rate of 5 pounds of water-based adhesive per hour, exhausting through two (2) stacks ID # 10 and

11;

- (g) One (1) automated compounding operation, identified as Unit ID #10, with a maximum usage rate of 524 pounds per hour, exhausting through one (1) stack ID #8;
- (h) One (1) manual hub glueing station, identified as Unit ID #11, constructed in 1977, with a maximum usage rate of 1.33 pounds of adhesive per hour, exhausting through two (2) stacks ID #12 and 22;
- (i) The following fugitive emission source with individual HAP emissions below 1 ton per year and a combination of HAP emissions below 2.5 tons per year:
 - (1) Evaporation of the solvent carrier for the liquid mold release used on flexible and rigid foam molds, identified as unit #33;
- (j) One (1) natural gas-fired boiler for area heating, with a maximum heat input capacity of less than 1 million British thermal units (MMBtu) per hour, exhausting through stack #18;
- (k) A product line for manufacturing and coating urethane foam flowerpot containers, identified as Unit #17, exhausting through stack #21, consisting of the following units:
 - (1) One (1) high pressure elastometer spraying machine; and
 - (2) One (1) spray booth, for the application of urethane elastometer coating to the foam containers.
- (l) Two (2) cold cleaner degreasing tanks, identified as Unit # 18 and Unit # 19, using Methylene Chloride as solvent.
- (m) One (1) Foam Mixing Line to produce varieties of product, such as surgical face masks; and polyurethane foam furniture cushion, and automobile interior parts, etc. This line will consist of the following emission units:
 - (1) One (1) Large Part Conveyor Line, identified as Unit #20: Edge Sweets FM, with the maximum capacity of 277 carrier per shift;
 - (2) One (1) Large Part Conveyor Line, identified as Unit #21: KraussMaffei FM, with the maximum capacity of 277 carrier per shift; and
 - (3) One (1) Large Part Conveyor Line, identified as Unit #22: Spray Booth, with the maximum capacity of 540 carrier per shift, exhausting through stack ID #23.
- (n) Process line LPC-2 consisting of the following:
 - (1) Two (2) urethane foam machines, identified as Units #30 and #31, each with a maximum production rate of 19.0 and 210.6 pounds of urethane parts per hour, respectively, each exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #32, using a maximum of 4.64 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #28);
 - (3) One (1) natural gas-fired drying oven, identified as Unit #34, with a maximum heat input capacity of 0.3 MMBtu per hour, exhausting through one (1) stack (Stack #29);
- (o) Process line LPC-3 consisting of the following:
 - (1) Two (2) urethane foam machines, identified as Units #35 and #36, with a total maximum production rate of 222.6 pounds of urethane parts per hour, each exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #37, using a maximum of 9.07 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #30);
 - (3) One (1) natural gas-fired drying oven, identified as Unit #38, with a maximum heat input capacity of 1.875 MMBtu per hour, exhausting through one (1) stack (Stack #31);
- (p) Process line LPC-4 consisting of the following:

- (1) One (1) high pressure foam machine, identified as Unit #23, with a maximum production rate of 33.9 pounds of urethane parts per hour, exhausting inside the building;
- (2) One (1) spray booth, identified as Unit #24, using a maximum of 3.15 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #25).

SECTION B GENERAL CONDITIONS

THIS SECTION OF THE PERMIT IS BEING ISSUED UNDER THE PROVISIONS OF 326 IAC 2-1.1 AND 40 CFR 52.780, WITH CONDITIONS LISTED BELOW.

B.1 Permit No Defense [IC 13]

This permit to construct does not relieve the Permittee of the responsibility to comply with the provisions of the Indiana Environmental Management Law (IC 13-11 through 13-20; 13-22 through 13-25; and 13-30), the Air Pollution Control Law (IC 13-17) and the rules promulgated thereunder, as well as other applicable local, state, and federal requirements.

B.2 Definitions

Terms in this permit shall have the definition assigned to such terms in the referenced regulation. In the absence of definitions in the referenced regulation, the applicable definitions found in the statutes or regulations IC 13-11, 326 IAC 1-2, and 326 IAC 2-1.1-1 shall prevail.

B.3 Effective Date of the Permit [IC13-15-5-3]

Pursuant to IC 13-15-5-3, this permit becomes effective upon its issuance.

B.4 Revocation of Permits [326 IAC 2-1.1-9(5)]

Pursuant to 326 IAC 2-1.1-9(5)(Revocation of Permits), the Commissioner may revoke this permit if construction is not commenced within eighteen (18) months after receipt of this approval or if construction is suspended for a continuous period of one (1) year or more.

B.5 Permit Term and Renewal [326 IAC 2-6.1-7(a)][326 IAC 2-1.1-9.5]

This permit is issued for a fixed term of five (5) years from the issuance date of this permit, as determined in accordance with IC 4-21.5-3-5(f) and IC 13-15-5-3. Subsequent revisions of this permit do not affect the expiration date.

The Permittee shall apply for an operation permit renewal at least ninety (90) days prior to the expiration date. If a timely and sufficient permit application for a renewal has been made, this permit shall not expire and all terms and conditions shall continue in effect until the renewal permit has been issued or denied.

B.6 Modification to Permit [326 IAC 2]

Notwithstanding the Section B condition entitled "Minor Source Operating Permit", all requirements and conditions of this construction permit shall remain in effect unless modified in a manner consistent with procedures established for modifications of construction permits pursuant to 326 IAC 2 (Permit Review Rules).

B.7 Minor Source Operating Permit [326 IAC 2-6.1]

This document shall also become a minor source operating permit pursuant to 326 IAC 2-6.1 when, prior to start of operation, the following requirements are met:

(a) The attached Affidavit of Construction shall be submitted to the Office of Air Quality (OAQ), Permit Administration & Development Section.

(1) If the Affidavit of Construction verifies that the facilities covered in this Construction Permit were constructed as proposed in the application, then the facilities may begin operating on the date the Affidavit of Construction is postmarked or hand delivered to IDEM.

- (2) If actual construction of the emission units differs from the construction proposed in the application, the source may not begin operation until the permit has been revised pursuant to 326 IAC 2-6.1-6 and an Operation Permit Validation Letter is issued.
- (b) If construction is completed in phases; i.e., the entire construction is not done continuously, a separate affidavit must be submitted for each phase of construction. Any permit conditions associated with operation start up dates such as stack testing for New Source Performance Standards (NSPS) shall be applicable to each individual phase.
- (c) Upon receipt of the Operation Permit Validation Letter from the Chief of the Permit Administration & Development Section, the Permittee shall attach it to this document.
- (d) The operation permit will be subject to annual operating permit fees pursuant to 326 IAC 2-1.1-7(Fees).

B.8 Annual Notification [326 IAC 2-6.1-5(a)(5)]

- (a) Annual notification shall be submitted to the Office of Air Quality stating whether or not the source is in operation and in compliance with the terms and conditions contained in this permit.
- (b) Noncompliance with any condition must be specifically identified. If there are any permit conditions or requirements for which the source is not in compliance at any time during the year, the Permittee must provide a narrative description of how the source did or will achieve compliance and the date compliance was, or will be, achieved. The notification must be signed by an authorized individual.
- (c) The annual notice shall cover the time period from January 1 to December 31 of the previous year, and shall be submitted in the format attached no later than March 1 of each year to:

Compliance Branch, Office of Air Quality
Indiana Department of Environmental Management
100 North Senate Avenue, P.O. Box 6015
Indianapolis, IN 46206-6015
- (d) The notification shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ, on or before the date it is due.

B.9 Preventive Maintenance Plan [326 IAC 1-6-3]

- (a) If required by specific condition(s) in Section D of this permit, the Permittee shall prepare and maintain Preventive Maintenance Plans (PMPs) within ninety (90) days after issuance of this permit, including the following information on each emissions unit:
 - (1) Identification of the individual(s) responsible for inspecting, maintaining, and repairing emission control devices;

- (2) A description of the items or conditions that will be inspected and the inspection schedule for said items or conditions; and
- (3) Identification and quantification of the replacement parts that will be maintained in inventory for quick replacement.

If, due to circumstances beyond the Permittee's control, the PMPs cannot be prepared and maintained within the above time frame, the Permittee may extend the date an additional ninety (90) days provided the Permittee notifies:

Indiana Department of Environmental Management
Compliance Branch, Office of Air Quality
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

The PMP extension notification does not require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).

- (b) The Permittee shall implement the PMPs, including any required record keeping, as necessary to ensure that failure to implement a PMP does not cause or contribute to an exceedance of any limitation on emissions or potential to emit.
- (c) A copy of the PMP's shall be submitted to IDEM, OAQ, upon request and within a reasonable time, and shall be subject to review and approval by IDEM, OAQ. IDEM, OAQ, may require the Permittee to revise its PMP whenever lack of proper maintenance causes or is the primary contributor to an exceedance of any limitation on emissions or potential to emit. The PMP does not require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (d) To the extent the Permittee is required by 40 CFR Part 60/63 to have an Operation, Maintenance, and Monitoring (OMM) Plan for a unit, such Plan is deemed to satisfy the PMP requirements of 326 IAC 1-6-3 for that unit.

B.10 Permit Revision [326 IAC 2-5.1-3(e)(3)] [326 IAC 2-6.1-6]

- (a) Permit revisions are governed by the requirements of 326 IAC 2-6.1-6.
- (b) Any application requesting an amendment or modification of this permit shall be submitted to:

Indiana Department of Environmental Management
Permits Branch, Office of Air Quality
100 North Senate Avenue, P.O. Box 6015
Indianapolis, Indiana 46206-6015

Any such application shall be certified by an "authorized individual" as defined by 326 IAC 2-1.1-1.

- (c) The Permittee shall notify the OAQ within thirty (30) calendar days of implementing a notice-only change. [326 IAC 2-6.1-6(d)]
- (d) No permit amendment or modification is required for the addition, operation or removal of a

nonroad engine, as defined in 40 CFR 89.2.

**B.11 Inspection and Entry [326 IAC 2-5.1-3(e)(4)(B)] [326 IAC 2-6.1-5(a)(4)][IC 13-14-2-2]
[IC 13-30-3-1][IC 13-17-3-2]**

Upon presentation of proper identification cards, credentials, and other documents as may be required by law, and subject to the Permittee's right under all applicable laws and regulations to assert that the information collected by the agency is confidential and entitled to be treated as such, the Permittee shall allow IDEM, OAQ, U.S. EPA, or an authorized representative to perform the following:

- (a) Enter upon the Permittee's premises where a permitted source is located, or emissions related activity is conducted, or where records must be kept under the conditions of this permit;
- (b) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, have access to and copy, at reasonable times, any records that must be kept under this title or the conditions of this permit or any operating permit revisions;
- (c) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, inspect, at reasonable times, any processes, emissions units (including monitoring and air pollution control equipment), practices, or operations regulated or required under this permit or any operating permit revisions;
- (d) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, sample or monitor, at reasonable times, substances or parameters for the purpose of assuring compliance with this permit or applicable requirements; and
- (e) As authorized by the Clean Air Act, IC 13-14-2-2, IC 13-17-3-2, and IC 13-30-3-1, utilize any photographic, recording, testing, monitoring, or other equipment for the purpose of assuring compliance with this permit or applicable requirements.

B.12 Transfer of Ownership or Operation [326 IAC 2-6.1-6(d)(3)]

Pursuant to [326 IAC 2-6.1-6(d)(3)] :

- (a) In the event that ownership of this source is changed, the Permittee shall notify IDEM, OAQ, Permits Branch, within thirty (30) days of the change.
- (b) The written notification shall be sufficient to transfer the permit to the new owner by an notice-only change pursuant to 326 IAC 2-6.1-6(d)(3).
- (c) IDEM, OAQ, shall issue a revised permit.

The notification which shall be submitted by the Permittee does require the certification by the "authorized individual" as defined by 326 IAC 2-1.1-1.

B.13 Annual Fee Payment [326 IAC 2-1.1-7]

- (a) The Permittee shall pay annual fees to IDEM, OAQ within thirty (30) calendar days of

receipt of a billing.

- (b) The Permittee may call the following telephone numbers: 1-800-451-6027 or 317-233-4230 (ask for OAQ, I/M & Billing Section), to determine the appropriate permit fee.

SECTION C

SOURCE OPERATION CONDITIONS

Entire Source

C.1 Particulate Emission Limitations For Processes with Process Weight Rates Less Than One Hundred (100) Pounds Per Hour [326 IAC 6-3-2]

Pursuant to 326 IAC 6-3-2(e)(2), particulate emissions from any process not exempt under 326 IAC 6-3-1(b) or (c) which has a maximum process weight rate less than 100 pounds per hour and the methods in 326 IAC 6-3-2(b) through (d) do not apply shall not exceed 0.551 pounds per hour.

C.2 Permit Revocation [326 IAC 2-1.1-9]

Pursuant to 326 IAC 2-1.1-9 (Revocation of Permits), this permit to construct and operate may be revoked for any of the following causes:

- (a) Violation of any conditions of this permit.
- (b) Failure to disclose all the relevant facts, or misrepresentation in obtaining this permit.
- (c) Changes in regulatory requirements that mandate either a temporary or permanent reduction of discharge of contaminants. However, the amendment of appropriate sections of this permit shall not require revocation of this permit.
- (d) Noncompliance with orders issued pursuant to 326 IAC 1-5 (Episode Alert Levels) to reduce emissions during an air pollution episode.
- (e) For any cause which establishes in the judgment of IDEM, the fact that continuance of this permit is not consistent with purposes of this article.

C.3 Opacity [326 IAC 5-1]

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Alternative Opacity Limitations), opacity shall meet the following, unless otherwise stated in this permit:

- (a) Opacity shall not exceed an average of forty percent (40%) in any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
- (b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.

C.4 Fugitive Dust Emissions [326 IAC 6-4]

The Permittee shall not allow fugitive dust to escape beyond the property line or boundaries of the property, right-of-way, or easement on which the source is located, in a manner that would violate 326 IAC 6-4 (Fugitive Dust Emissions).

C.5 Asbestos Abatement Projects [326 IAC 14-10] [326 IAC 18] [40 CFR 61, Subpart M]

- (a) Notification requirements apply to each owner or operator. If the combined amount of regulated asbestos containing material (RACM) to be stripped, removed or disturbed is at least 260 linear feet on pipes or 160 square feet on other facility components, or at least thirty-five (35) cubic feet on all facility components, then the notification requirements of 326 IAC 14-10-3 are mandatory. All demolition projects require notification whether or not asbestos is present.
- (b) The Permittee shall ensure that a written notification is sent on a form provided by the Commissioner at least ten (10) working days before asbestos stripping or removal work or before demolition begins, per 326 IAC 14-10-3, and shall update such notice as necessary, including, but not limited to the following:
 - (1) When the amount of affected asbestos containing material increases or decreases by at least twenty percent (20%); or
 - (2) If there is a change in the following:
 - (A) Asbestos removal or demolition start date;
 - (B) Removal or demolition contractor; or
 - (C) Waste disposal site.
- (c) The Permittee shall ensure that the notice is postmarked or delivered according to the guidelines set forth in 326 IAC 14-10-3(2).
- (d) The notice to be submitted shall include the information enumerated in 326 IAC 14-10-3(3).

All required notifications shall be submitted to:

Indiana Department of Environmental Management
Asbestos Section, Office of Air Quality
100 North Senate Avenue, P.O. Box 6015
Indianapolis, Indiana 46206-6015

The notice shall include a signed certification from the owner or operator that the information provided in this notification is correct and that only Indiana licensed workers and project supervisors will be used to implement the asbestos removal project. The notifications do not require a certification by an "authorized individual" as defined by 326 IAC 2-7-1(34).

- (e) Procedures for Asbestos Emission Control
The Permittee shall comply with the applicable emission control procedures in 326 IAC 14-10-4 and 40 CFR 61.145(c). Per 326 IAC 14-10-1, emission control requirements are applicable for any removal or disturbance of RACM greater than three (3) linear feet on pipes or three (3) square feet on any other facility components or a total of at least 0.75 cubic feet on all facility components.

- (f) Demolition and renovation
The Permittee shall thoroughly inspect the affected facility or part of the facility where the demolition or renovation will occur for the presence of asbestos pursuant to 40 CFR 61.145(a).
- (g) Indiana Accredited Asbestos Inspector
The Permittee shall comply with 326 IAC 14-10-1(a) that requires the owner or operator, prior to a renovation/demolition, to use an Indiana Accredited Asbestos Inspector to thoroughly inspect the affected portion of the facility for the presence of asbestos. The requirement to use an Indiana Accredited Asbestos inspector is not federally enforceable.

Testing Requirements

C.6 Performance Testing [326 IAC 3-6]

- (a) Compliance testing on new emissions units shall be conducted within 60 days after achieving maximum production rate, but no later than 180 days after initial start-up, if specified in Section D of this approval. All testing shall be performed according to the provisions of 326 IAC 3-6 (Source Sampling Procedures), except as provided elsewhere in this permit, utilizing any applicable procedures and analysis methods specified in 40 CFR 51, 40 CFR 60, 40 CFR 61, 40 CFR 63, 40 CFR 75, or other procedures approved by IDEM, OAQ.

A test protocol, except as provided elsewhere in this permit, shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015

no later than thirty-five (35) days prior to the intended test date.

- (b) The Permittee shall notify IDEM, OAQ of the actual test date at least fourteen (14) days prior to the actual date.
- (c) Pursuant to 326 IAC 3-6-4(b), all test reports must be received by IDEM, OAQ not later than forty-five (45) days after the completion of the testing. An extension may be granted by the IDEM, OAQ, if the Permittee submits to IDEM, OAQ, a reasonable written explanation not later than five (5) days prior to the end of the initial forty-five (45) day period.

Compliance Requirements [326 IAC 2-1.1-11]

C.7 Compliance Requirements [326 IAC 2-1.1-11]

The commissioner may require stack testing, monitoring, or reporting at any time to assure compliance with all applicable requirements by issuing an order under 326 IAC 2-1.1-11. Any monitoring or testing shall be performed in accordance with 326 IAC 3 or other methods approved by the commissioner or the U.S. EPA.

Compliance Monitoring Requirements

C.8 Compliance Monitoring [326 IAC 2-1.1-11]

Compliance with applicable requirements shall be documented as required by this permit. The Permittee shall be responsible for installing any necessary equipment and initiating any required monitoring related to that equipment. All monitoring and record keeping requirements not already legally required shall be implemented when operation begins.

C.9 Monitoring Methods [326 IAC 3][40 CFR 60][40 CFR 63]

Any monitoring or testing required by Section D of this permit shall be performed according to the provisions of 326 IAC 3, 40 CFR 60, Appendix A, 40 CFR 60, Appendix B, 40 CFR 63, or other approved methods as specified in this permit.

C.10 Actions Related to Noncompliance Demonstrated by a Stack Test

- (a) When the results of a stack test performed in conformance with Section C - Performance Testing, of this permit exceed the level specified in any condition of this permit, the Permittee shall take appropriate response actions. The Permittee shall submit a description of these response actions to IDEM, OAQ, within thirty (30) days of receipt of the test results. The Permittee shall take appropriate action to minimize excess emissions from the affected emissions unit while the response actions are being implemented.
- (b) A retest to demonstrate compliance shall be performed within one hundred twenty (120) days of receipt of the original test results. Should the Permittee demonstrate to IDEM, OAQ that retesting in one-hundred and twenty (120) days is not practicable, IDEM, OAQ may extend the retesting deadline.
- (a) IDEM, OAQ reserves the authority to take any actions allowed under law in response to noncompliant stack tests.

The response action documents submitted pursuant to this condition do not require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1.

Record Keeping and Reporting Requirements

C.11 Malfunctions Report [326 IAC 1-6-2]

Pursuant to 326 IAC 1-6-2 (Records; Notice of Malfunction):

- (a) A record of all malfunctions, including startups or shutdowns of any facility or emission control equipment, which result in violations of applicable air pollution control regulations or applicable emission limitations shall be kept and retained for a period of three (3) years and shall be made available to the Indiana Department of Environmental Management (IDEM), Office of Air Quality (OAQ) or appointed representative upon request.
- (b) When a malfunction of any facility or emission control equipment occurs which lasts more than one (1) hour, said condition shall be reported to OAQ, using the Malfunction Report Forms (2 pages). Notification shall be made by telephone or facsimile, as soon as practicable, but in no event later than four (4) daytime business hours after the beginning of said occurrence.

- (c) Failure to report a malfunction of any emission control equipment shall constitute a violation of 326 IAC 1-6, and any other applicable rules. Information of the scope and expected duration of the malfunction shall be provided, including the items specified in 326 IAC 1-6-2(a)(1) through (6).
- (d) Malfunction is defined as any sudden, unavoidable failure of any air pollution control equipment, process, or combustion or process equipment to operate in a normal and usual manner. [326 IAC 1-2-39]

C.12 General Record Keeping Requirements [326 IAC 2-6.1-5]

- (a) Records of all required monitoring data, reports and support information required by this permit shall be retained for a period of at least five (5) years from the date of monitoring sample, measurement, report, or application. These records shall be physically present or electronically accessible at the source location for a minimum of three (3) years. The records may be stored elsewhere for the remaining two (2) years as long as they are available upon request. If the Commissioner makes a request for records to the Permittee, the Permittee shall furnish the records to the Commissioner within a reasonable time.
- (b) Unless otherwise specified in this permit, all record keeping requirements not already legally required shall be implemented when operation begins.

C.13 General Reporting Requirements [326 IAC 2-1.1-11] [326 IAC 2-6.1-2] [IC 13-14-1-13]

- (a) Reports required by conditions in Section D of this permit shall be submitted to:

Indiana Department of Environmental Management
Compliance Data Section, Office of Air Quality
100 North Senate Avenue, P. O. Box 6015
Indianapolis, Indiana 46206-6015
- (b) Unless otherwise specified in this permit, any notice, report, or other submission required by this permit shall be considered timely if the date postmarked on the envelope or certified mail receipt, or affixed by the shipper on the private shipping receipt, is on or before the date it is due. If the document is submitted by any other means, it shall be considered timely if received by IDEM, OAQ, on or before the date it is due.
- (c) Unless otherwise specified in this permit, any quarterly report required in Section D of this permit shall be submitted within thirty (30) days of the end of the reporting period. The reports do not require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1(1).
- (d) The first report shall cover the period commencing on the date of issuance of this permit and ending on the last day of the reporting period. Reporting periods are based on calendar years.

SECTION D.1

FACILITY OPERATION CONDITIONS

Facility Description [326 IAC 2-7-5(15)]:

- (a) Five (5) two component, polyurethane foam machines, identified as Unit ID Nos. 1, 2, 3, 4, and 5, each constructed in 1984 (Unit #1), 1989 (Unit #5), 1991 (Units #2 and #3) and February 23, 1989 (Unit #4), each with a maximum production rate of 3,873 pads per day, each exhausting through one (1) stack ID #4 (Unit #5), ID #5 (Unit #1), ID #7 (Units #2 and #3), and ID #19 (Unit #4);
- (b) Two (2) two component, polyurethane foam machines, used in product development, identified as Unit ID Nos. 6 and 7, each constructed in 1992 and 1989, respectively, each with a maximum production rate of 100 pads per day, each exhausting through one (1) stack ID #13;
- (c) One (1) two component, polyurethane foam machine, identified as Unit ID #14, constructed in 1998, with a maximum production rate of 3,873 pads per day, exhausting through one (1) stack ID #20;
- (d) One (1) two component, elastomeric foam machine, identified as Unit ID #16, constructed in February 11, 1998, with a maximum production rate of 1731 pads per day, exhausting through one (1) stack ID #9;
- (e) One (1) automated hub assembly, identified as Unit ID #8, constructed in 1995, with a maximum usage rate of 1.33 pounds of adhesive per hour, exhausting to general ventilation (GV);
- (f) One (1) fabric roller coater, identified as Unit ID #9, used for the application of sealant to hook fabric products, constructed on November 7, 1985, with a maximum usage rate of 5 pounds of water-based adhesive per hour, exhausting through two (2) stacks ID # 10 and 11;
- (g) One (1) automated compounding operation, identified as Unit ID #10, with a maximum usage rate of 524 pounds per hour, exhausting through one (1) stack ID #8;
- (h) One (1) manual hub glueing station, identified as Unit ID #11, constructed in 1977, with a maximum usage rate of 1.33 pounds of adhesive per hour, exhausting through two (2) stacks ID #12 and 22;
- (i) The following fugitive emission source with individual HAP emissions below 1 ton per year and a combination of HAP emissions below 2.5 tons per year:
 - (1) Evaporation of the solvent carrier for the liquid mold release used on flexible and rigid foam molds, identified as unit #33;
- (j) One (1) natural gas-fired boiler for area heating, with a maximum heat input capacity of less than 1 million British thermal units (MMBtu) per hour, exhausting through stack #18;
- (k) A product line for manufacturing and coating urethane foam flowerpot containers, identified as Unit #17, exhausting through stack #21, consisting of the following units:
 - (1) One (1) high pressure elastometer spraying machine; and
 - (2) One (1) spray booth, for the application of urethane elastometer coating to the foam containers.
- (l) Two (2) cold cleaner degreasing tanks, identified as Unit # 18 and Unit # 19, using Methylene Chloride as solvent.
- (m) One (1) Foam Mixing Line to produce varieties of product, such as surgical face masks; and polyurethane foam furniture cushion, and automobile interior parts, etc. This line will consist of the following emission units:
 - (1) One (1) Large Part Conveyor Line, identified as Unit #20: Edge Sweets FM, with the maximum capacity of 277 carrier per shift;
 - (2) One (1) Large Part Conveyor Line, identified as Unit #21: KraussMaffei FM, with the maximum capacity of 277 carrier per shift; and
 - (3) One (1) Large Part Conveyor Line, identified as Unit #22: Spray Booth, with the

- maximum capacity of 540 carrier per shift, exhausting through stack ID #23.
- (n) Process line LPC-2 consisting of the following:
 - (1) Two (2) urethane foam machines, identified as Units #30 and #31, each with a maximum production rate of 19.0 and 210.6 pounds of urethane parts per hour, respectively, each exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #32, using a maximum of 4.64 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #28);
 - (3) One (1) natural gas-fired drying oven, identified as Unit #34, with a maximum heat input capacity of 0.3 MMBtu per hour, exhausting through one (1) stack (Stack #29);
 - (o) Process line LPC-3 consisting of the following:
 - (1) Two (2) urethane foam machines, identified as Units #35 and #36, with a total maximum production rate of 222.6 pounds of urethane parts per hour, each exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #37, using a maximum of 9.07 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #30);
 - (3) One (1) natural gas-fired drying oven, identified as Unit #38, with a maximum heat input capacity of 1.875 MMBtu per hour, exhausting through one (1) stack (Stack #31);
 - (p) Process line LPC-4 consisting of the following:
 - (1) One (1) high pressure foam machine, identified as Unit #23, with a maximum production rate of 33.9 pounds of urethane parts per hour, exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #24, using a maximum of 3.15 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #25).

(The information describing the process contained in this facility description box is descriptive information and does not constitute enforceable conditions.)

Emission Limitations and Standards

D.1.1 Particulate Emission Limitations for Sources of Indirect Heating [326 IAC 6-2-4]

Pursuant to 326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating) the particulate matter emissions from the one (1) boiler, constructed after September 21, 1983, are limited to 0.6 lb/mmBtu.

D.1.2 Batch Cold Cleaning Machine Standards NESHAP [326 IAC 14 and 40 CFR Part 63.462, Subpart T]

Pursuant to National Emission Standards for Hazardous Air Pollutants (NESHAP), 326 IAC 14 and 40 CFR Part 63.462, Subpart T (Batch Cold Cleaning Machine Standards):

- (a) Each owner or operator of an immersion batch cold solvent cleaning machine shall comply with the following:
 - (1) Employ a tightly fitting cover that shall be closed at all times except during parts entry and removal, and a water layer at a minimum thickness of 2.5 cm (1.0 inch) on the surface of the solvent within the cleaning machine, or
 - (2) Employ a tightly fitting cover that shall be closed at all times except during parts

entry and removal and a freeboard ratio of 0.75 or greater.

- (b) Each owner or operator of a remote-reservoir batch cold solvent cleaning machine shall employ a tightly fitting cover over the solvent sump that shall be closed at all times except during the cleaning of parts.
- (c) Each owner or operator of a batch cold cleaning machine shall comply with the work and operational practice requirements as follows:
 - (1) All waste solvent shall be collected and stored on closed containers. The closed container may contain a device that allows pressure relief, but does not allow liquid solvent to drain from the container.
 - (2) If a flexible hose or flushing device is used, flushing shall be performed only within the freeboard area of the solvent cleaning machine.
 - (3) The owner or operator shall drain solvent cleaned parts for 15 seconds or until dripping has stopped, whichever is longer. Parts having cavities or blind holes shall be tipped or rotated while draining.
 - (4) The owner or operator shall ensure that the solvent level does not exceed the fill line.
 - (5) Spills during solvent transfer shall be wiped up immediately. The wipe rags shall be stored in covered containers meeting the requirements of (C)(i) of this section.
 - (6) When an air - or pump - agitated solvent bath is used, the owner or operator shall ensure that the agitator is operated to produce a rolling motion of the solvent but not observable splashing against tank walls or parts being cleaned.
 - (7) The owner or operator shall ensure that, when the cover is open, the cold cleaning machine is not exposed to drafts greater than 40 meters per minute (132 feet per minute), as measured between 1 and 2 meters (3.3 and 6.6 feet) upwind and at the same elevation as the tank lip.
 - (8) Except as provided in paragraph (C)(ix) of this section, sponges, fabric, wood, and paper products shall not be cleaned.
 - (9) The prohibition in paragraph (C)(viii) of this section does not apply to the cleaning of porous materials that are parts of polychlorinated biphenyl (PCB) laden transformers if those transformers are handled throughout the cleaning process and disposed of in compliance with an approved PCB disposal permit issued in accordance with the Toxic Substances Control Act.

D.1.3 Volatile Organic Compounds [326 IAC 8-1-1(b)]

Any change or modification which may increase the actual VOC emissions from the degreasing operations to greater than 15 pounds per day will be subject to 326 IAC 8-3 and must be approved by the Office of Air Quality (OAQ) before such change may occur.

D.1.4 Volatile Organic Compounds (VOC) [326 IAC 8-1-6]

The use of VOC, including coatings, dilution solvents, and cleaning solvents, in the spray booth, identified as Unit ID No. 37, shall be less than 25 tons per 12 consecutive month period with compliance determined at the end of each month. This usage limit is required to limit the potential to emit of VOC to less than 25 tons per 12 consecutive month period. Compliance with this limit makes 326 IAC 8-1-6 (New Facilities; General Reduction Requirements) not applicable.

D.1.5 Volatile Organic Compounds (VOC) [326 IAC 8-1-6]

Any change or modification which may increase the potential volatile organic compounds emissions to 25 tons per year or more from the equipment covered in this permit, other than Unit ID No. 37, must be approved by the Office of Air Quality (OAQ) before such change may occur.

D.1.6 Hazardous Air Pollutants

Any change or modification which may increase the single HAP emissions to 10 tons per year or 25 tons per year for a combination of HAPs from the equipment covered in this permit must be approved by the Office of Air Quality (OAQ) before such change may occur.

D.1.7 Preventive Maintenance Plan [326 IAC 1-6-3]

A Preventive Maintenance Plan, in accordance with Section B - Preventive Maintenance Plan, of this permit, is required for this facility and any control devices.

Compliance Determination Requirements

D.1.8 Volatile Organic Compounds (VOC)

Compliance with the VOC content and usage limitations contained in Condition D.1.4 shall be determined pursuant to 326 IAC 8-1-4(a)(3) and 326 IAC 8-1-2(a) using formulation data supplied by the coating manufacturer.

D.1.9 VOC Emissions

Compliance with Condition D.1.4 shall be demonstrated within 30 days of the end of each month based on the total volatile organic compound usage for the twelve (12) month period.

Compliance Monitoring Requirements [326 IAC 2-7-6(1)] [326 IAC 2-7-5(1)]

There are no applicable compliance monitoring requirements for this source.

Record Keeping and Reporting Requirements [326 IAC 2-5.1-3(e)(2)] [326 IAC 2-6.1-5(a)(2)]

D.1.10 Record Keeping Requirements

- (a) To document compliance with Conditions D.1.3 through D.1.6, the Permittee shall maintain records in accordance with (1) through (4) below. Records maintained for (1) through (4) shall be taken monthly and shall be complete and sufficient to establish compliance with the VOC usage limits and/or the VOC emission limits established in Condition D.1.4 and to establish compliance with conditions D.1.3, D.1.5, and D.1.6. Records necessary to demonstrate compliance shall be available within 30 days of the end of each compliance period.
 - (1) The amount and VOC content of each coating material and solvent used. Records shall include purchase orders, invoices, and material safety data sheets (MSDS) necessary to verify the type and amount used.
 - (2) The total VOC, single HAP, and total HAPs usage for each month;
 - (3) The VOC usage for the degreasing operations each day; and
 - (4) The weight of VOCs, single HAP, and total HAPs emitted for each compliance period.
- (b) To document compliance with Condition D.1.7, the Permittee shall maintain records of any additional inspections prescribed by the Preventive Maintenance Plan.
- (c) All records shall be maintained in accordance with Section C - General Record Keeping Requirements, of this permit.

D.1.11 Reporting Requirements [40 CFR 63.468, Subpart T]

Pursuant to 40 CFR 63.462(d), each owner or operator shall submit an initial notification report as described in 40 CFR 63.468(a) (for existing machines) and (b) (for new machines) and a compliance report as described in 40 CFR 63.468(c). Pursuant to 40 CFR 63.468 (b):

- (a) Each owner or operator of a new solvent cleaning machine shall submit an initial notification report to the Administrator. New sources for which the construction or reconstruction commenced after December 2, 1994, shall submit this report as soon as practicable before the construction or reconstruction is planned to commence. This report shall include all of the information required in 40 CFR 63.5(d)(1) of Subpart A (General Provisions), with the revisions and additions in paragraphs (a)(1) through (a)(3) of this section.
 - (1) The report shall include a brief description of each solvent cleaning machine including machine type (batch vapor), batch cold, vapor in-line, or cold-line), solvent/air interface area, and existing controls.
 - (2) The report shall include the anticipated compliance approach for each solvent cleaning machine.
 - (3) In lieu of 40 CFR 63.5 (d)(1)(ii)(H) of subpart A of this part, the owner or operator must report an estimate of annual halogenated HAP solvent consumption for each solvent cleaning machine.
- (b) Each owner or operator of a batch cold solvent cleaning machine subject to the provisions of this subpart shall submit a compliance report to the Administrator. For new sources, this report shall be submitted to the Administrator no later than 150 days after startup, or May 1, 1995, whichever is later. This report shall include the following requirements:
 - (1) The name and address of the owner or operator.
 - (2) The address (i.e. physical location) of the solvent cleaning machine(s).
 - (3) A statement, signed by the owner or operator of the solvent cleaning machine, stating that the solvent cleaning machine for which the report is being submitted is in compliance with the provisions of this subpart.
 - (4) The compliance approach for each solvent cleaning machine.

D.1.12 Reporting Requirements

A quarterly summary of the information to document compliance with Condition D.1.4 shall be submitted to the address listed in Section C - General Reporting Requirements, of this permit, using the reporting forms located at the end of this permit, or their equivalent, within thirty (30) days after the end of the quarter being reported. The report submitted by the Permittee does require the certification by an "authorized individual" as defined by 326 IAC 2-1.1-1.

**Indiana Department of Environmental Management
Office of Air Quality
Compliance Data Section**

Quarterly Report

Company Name: Perry Chemical & Manufacturing Company, Inc.
Location: 2335 South 30th Street, Lafayette, Indiana 47903
Permit No.: MSOP 157-18141-00080
Source: Spray Booth Unit No. 37
Pollutant: Volatile Organic Compounds (VOC)
Limit: The use of VOC, including coatings, dilution solvents, and cleaning solvents, in the spray booth, identified as Unit ID No. 37, shall be less than 25 tons per 12 consecutive month period with compliance determined at the end of each month.

Year: _____

Month	VOC Usage This Month (tons)	VOC Usage Previous 11 Months (tons)	12 Month Total VOC Usage (tons)

Submitted by: _____

Title/Position: _____

Signature: _____

Date: _____

MINOR SOURCE OPERATING PERMIT ANNUAL NOTIFICATION

Company Name:	Perry Chemical & Manufacturing Company, Inc.
Address:	2335 South 30th Street
City:	Lafayette, Indiana 47903
Phone #:	(765) 474-3404
MSOP #:	157-18141-00080

I hereby certify that Perry Chemical & Manufacturing Co., Inc. is
☐ in compliance with the requirements of MSOP 157-18141-00080.
☐ not in compliance with the requirements of MSOP 157-18141-00080.

Authorized Individual (typed):
Title:
Signature:
Date:

Noncompliance:

MALFUNCTION REPORT

**INDIANA DEPARTMENT OF ENVIRONMENTAL MANAGEMENT
OFFICE OF AIR QUALITY
FAX NUMBER - 317 233-5967**

**This form should only be used to report malfunctions applicable to Rule 326 IAC 1-6
and to qualify for the exemption under 326 IAC 1-6-4.**

THIS FACILITY MEETS THE APPLICABILITY REQUIREMENTS BECAUSE IT HAS POTENTIAL TO EMIT 25 TONS/YEAR PARTICULATE MATTER ?____, 25 TONS/YEAR SULFUR DIOXIDE ?____, 25 TONS/YEAR NITROGEN OXIDES?____, 25 TONS/YEAR VOC ?____, 25 TONS/YEAR HYDROGEN SULFIDE ?____, 25 TONS/YEAR TOTAL REDUCED SULFUR ?____, 25 TONS/YEAR REDUCED SULFUR COMPOUNDS ?____, 25 TONS/YEAR FLUORIDES ?____, 100TONS/YEAR CARBON MONOXIDE ?____, 10 TONS/YEAR ANY SINGLE HAZARDOUS AIR POLLUTANT ?____, 25 TONS/YEAR ANY COMBINATION HAZARDOUS AIR POLLUTANT ?____, 1 TON/YEAR LEAD OR LEAD COMPOUNDS MEASURED AS ELEMENTAL LEAD ?____, OR IS A SOURCE LISTED UNDER 326 IAC 2-5.1-3(2) ?____. EMISSIONS FROM MALFUNCTIONING CONTROL EQUIPMENT OR PROCESS EQUIPMENT CAUSED EMISSIONS IN EXCESS OF APPLICABLE LIMITATION _____.

THIS MALFUNCTION RESULTED IN A VIOLATION OF: 326 IAC _____ OR, PERMIT CONDITION # _____ AND/OR PERMIT LIMIT OF _____

THIS INCIDENT MEETS THE DEFINITION OF 'MALFUNCTION' AS LISTED ON REVERSE SIDE ? Y N

THIS MALFUNCTION IS OR WILL BE LONGER THAN THE ONE (1) HOUR REPORTING REQUIREMENT ? Y N

COMPANY: Perry Chemical & Manufacturing Company, Inc. PHONE NO. (765) 474-3404
LOCATION: (CITY AND COUNTY) Lafayette, Tippecanoe County
PERMIT NO. 157-18141 AFS PLANT ID: 157-00080 AFS POINT ID: _____ INSP: Wanda Stanfield
CONTROL/PROCESS DEVICE WHICH MALFUNCTIONED AND REASON: _____

DATE/TIME MALFUNCTION STARTED: ____/____/20____ AM / PM

ESTIMATED HOURS OF OPERATION WITH MALFUNCTION CONDITION: _____

DATE/TIME CONTROL EQUIPMENT BACK-IN SERVICE ____/____/20____ AM/PM

TYPE OF POLLUTANTS EMITTED: TSP, PM-10, SO2, VOC, OTHER: _____

ESTIMATED AMOUNT OF POLLUTANT EMITTED DURING MALFUNCTION: _____

MEASURES TAKEN TO MINIMIZE EMISSIONS: _____

REASONS WHY FACILITY CANNOT BE SHUTDOWN DURING REPAIRS: _____

CONTINUED OPERATION REQUIRED TO PROVIDE ESSENTIAL* SERVICES: _____

CONTINUED OPERATION NECESSARY TO PREVENT INJURY TO PERSONS: _____

CONTINUED OPERATION NECESSARY TO PREVENT SEVERE DAMAGE TO EQUIPMENT: _____

INTERIM CONTROL MEASURES: (IF APPLICABLE) _____

MALFUNCTION REPORTED BY: _____ TITLE: _____
(SIGNATURE IF FAXED)

MALFUNCTION RECORDED BY: _____ DATE: _____ TIME: _____

*SEE PAGE 2

PAGE 1 OF 2

**Please note - This form should only be used to report malfunctions
applicable to Rule 326 IAC 1-6 and to qualify for
the exemption under 326 IAC 1-6-4.**

326 IAC 1-6-1 Applicability of rule

Sec. 1. This rule applies to the owner or operator of any facility required to obtain a permit under 326 IAC 2-5.1 or 326 IAC 2-6.1.

326 IAC 1-2-39 "Malfunction" definition

Sec. 39. Any sudden, unavoidable failure of any air pollution control equipment, process, or combustion or process equipment to operate in a normal and usual manner.

***Essential services** are interpreted to mean those operations, such as, the providing of electricity by power plants. Continued operation solely for the economic benefit of the owner or operator shall not be sufficient reason why a facility cannot be shutdown during a control equipment shutdown.

If this item is checked on the front, please explain rationale:

Mail to: Permit Administration & Development Section
Office Of Air Quality
100 North Senate Avenue
P. O. Box 6015
Indianapolis, Indiana 46206-6015

Perry Chemical & Manufacturing Company, Inc.
P.O. Box 6419
Lafayette, Indiana 47903-6419

Affidavit of Construction

I, _____, being duly sworn upon my oath, depose and say:
(Name of the Authorized Representative)

1. I live in _____ County, Indiana and being of sound mind and over twenty-one (21) years of age, I am competent to give this affidavit.
2. I hold the position of _____ for _____.
(Title) (Company Name)
3. By virtue of my position with _____, I have personal
(Company Name)
knowledge of the representations contained in this affidavit and am authorized to make
these representations on behalf of _____.
(Company Name)
4. I hereby certify that Perry Chemical & Manufacturing Company, Inc., 2335 South 30th Street, Lafayette, Indiana 47903, completed construction of the new process lines LPC-2, LPC-3, and LPC-4 and their associated emission units on _____ in conformity with the requirements and intent of the construction permit application received by the Office of Air Quality on September 16, 2003 and as permitted pursuant to New Source Construction Permit and Minor Source Operating Permit No. 157-18141, Plant ID No. 157-00080 issued on _____.

Further Affiant said not.

I affirm under penalties of perjury that the representations contained in this affidavit are true, to the best of my information and belief.

Signature

Date

STATE OF INDIANA)
)SS

COUNTY OF _____)

Subscribed and sworn to me, a notary public in and for _____ County and State of Indiana on this
_____ day of _____, 20 _____.

My Commission expires: _____

Signature

Name (typed or printed)

Indiana Department of Environmental Management Office of Air Quality

Addendum to the Technical Support Document for a Minor Source Operating Permit

Source Name: Perry Chemical & Manufacturing Company, Inc.
Source Location: 2335 South 30th Street, Lafayette, Indiana 47903-6419
County: Tippecanoe
SIC Code: 3086
Operation Permit No.: 157-18141-00080
Permit Reviewer: Trish Earls/EVP

On December 26, 2003, the Office of Air Quality (OAQ) had a notice published in the Journal & Courier, Lafayette, Indiana, stating that Perry Chemical & Manufacturing Company, Inc. had applied for a permit to operate a flexible polyurethane foam casting plant. The notice also stated that OAQ proposed to issue a permit for this installation and provided information on how the public could review the proposed permit and other documentation. Finally, the notice informed interested parties that there was a period of thirty (30) days to provide comments on whether or not this permit should be issued as proposed.

On January 22, 2004, Robert D. Waugaman of Bruce Carter Associates, LLC submitted comments on the proposed permit on behalf of Perry Chemical & Manufacturing Company, Inc. A summary of the comment and response is below:

Comment #1

Please change Condition A.2(e) to show that Unit ID #8 exhausts to general ventilation (GV) instead of stack ID #16. The same change should also be made to the facility description in Section D.1.

Response #1

Section A.2, paragraph (e), is revised to read as follows:

A.2 Emissions Units and Pollution Control Equipment Summary

- (e) One (1) automated hub assembly, identified as Unit ID #8, constructed in 1995, with a maximum usage rate of 1.33 pounds of adhesive per hour, exhausting ~~through one (1) stack ID #16~~ **to general ventilation (GV)**;

The facility description in section D.1 has also been revised as shown above.

Comments #2 and #3

The stack summary table in the TSD, page 4 of 12, should be updated to remove Unit ID #8 from stack ID 16, as noted above, and to change the stack ID 16 to stack ID 17.

Please add the unit ID to the Fabric Roller Coater stack listing on the stack summary table in the TSD, page 4 of 12. The unit number should be Unit #9 and is related to stacks 10 and 11.

Response s #2 and #3

The OAQ prefers that the Technical Support Document reflect the permit that was on public notice. Changes to the permit or technical support material that occur after the public notice are documented in this Addendum to the Technical Support Document. This accomplishes the desired result of ensuring that these types of concerns are documented and are part of the record regarding this permit decision. The stack summary table is revised as documented in this addendum to read as follows:

Stack Summary

Stack ID	Operation	Height (feet)	Diameter (feet)	Flow Rate (acfm)	Temperature (°F)
3	Compounding/Hood	12.0	0.83	650	70
4	Diskit Room B (Unit ID #5)	11.58	0.83	650	70
5	Diskit Room A (Unit ID #1)	12.0	0.83	650	70
7	Diskit Room A (Unit ID #2) and Diskit Room B (Unit #3)	11.58	0.83	650	70
8	Automated Compounding (Unit #10)	horizontal exiting at 12.5'	0.33	650	150
9	Unit ID #16	12.5	0.83	650	70
10	Fabric Roller Coater (Unit ID #9)	12.13	0.83	650	70
11	Fabric Roller Coater (Unit ID #9)	2.0	3.0	11,875	70
12	Unit ID #11	16.13	0.83	650	70
13	Unit ID #s 6 and 7	16.13	0.83	650	70
16 17	Air Compressor Room & Unit ID #8	16.17	3.0	14,600	70
18	Area Heating Boiler	18.0	0.83	1000	70
19	Unit ID #4	12.5	0.83	200	70
20	Diskit Room B (Unit ID #14)	11.58	0.83	650	70
21	Unit ID #17	26.0	2.5	8450	70
22	Unit ID #11	12.0	0.83	650	70
23	Unit #22	24.0	2.0	5200	70
25	Unit #24	18.0	2.0	650	80
28	Unit #32	18.0	2.0	650	80
29	Unit #34	18.0	2.0	650	80
30	Unit #37	18.0	2.0	650	80
31	Unit #38	18.0	2.0	650	80

Comment #4

Condition D.1.10 (a) requires record keeping to show compliance with the VOC limits contained in Conditions D.1.3, D.1.4, and D.1.5. Condition D.1.10 (a) also requires record keeping of single HAP and total HAP to show compliance with Condition D.1.6. IDEM has determined that the potential HAP emissions are only 5.8 tons per year (TPY) and total HAP emissions are only 8.49 TPY, both well below their respective thresholds of 10 TPY and 25 TPY. Further, Condition D.1.6 requires Perry Chemical to notify IDEM prior to any changes that may increase HAP emissions to these thresholds. To require Perry Chemical to track HAP usage on a monthly basis is unnecessary and overburdensome. Perry Chemical requests that Condition D.1.10 be modified to remove both references to D.1.6 in D.1.10(a) and to remove the HAP record keeping requirements contained in Conditions D.1.10(a)(2) and D.1.10(a)(4).

Response #4

This source must prove on a continuous basis that this source is not subject to 40 CFR 63.1290 through 63.1309, Subpart III (Flexible Polyurethane Foam Production), 40 CFR 63.3280 through 63.3420, Subpart JJJJ (Paper and Other Web Coating), and 326 IAC 2-7 (Part 70) because potential emissions of any single HAP are less than 10 tons per year and potential emissions of any combination of HAPs is less than 25 tons per year. Therefore, the requirement to maintain the records of HAP usage/emissions is necessary to prove that the source is not subject to these rules. No changes have been made to condition D.1.10 as a result of this comment.

Indiana Department of Environmental Management Office of Air Quality

Technical Support Document (TSD) for a New Source Construction and Minor Source Operating Permit

Source Background and Description

Source Name: Perry Chemical & Manufacturing Company, Inc.
Source Location: 2335 South 30th Street, Lafayette, Indiana 47903-6419
County: Tippecanoe
SIC Code: 3086
Operation Permit No.: 157-18141-00080
Permit Reviewer: Trish Earls/EVP

The Office of Air Quality (OAQ) has reviewed an application from Perry Chemical & Manufacturing Company, Inc. relating to the construction and operation of a flexible polyurethane foam casting plant.

Permitted Emission Units and Pollution Control Equipment

The source consists of the following permitted emission units and pollution control devices:

- (a) Five (5) two component, polyurethane foam machines, identified as Unit ID Nos. 1, 2, 3, 4, and 5, each constructed in 1984 (Unit #1), 1989 (Unit #5), 1991 (Units #2 and #3) and February 23, 1989 (Unit #4), each with a maximum production rate of 3,873 pads per day, each exhausting through one (1) stack ID #4 (Unit #5), ID #5 (Unit #1), ID #7 (Units #2 and #3), and ID #19 (Unit #4);
- (b) Two (2) two component, polyurethane foam machines, used in product development, identified as Unit ID Nos. 6 and 7, each constructed in 1992 and 1989, respectively, each with a maximum production rate of 100 pads per day, each exhausting through one (1) stack ID #13;
- (c) One (1) two component, polyurethane foam machine, identified as Unit ID #14, constructed in 1998, with a maximum production rate of 3,873 pads per day, exhausting through one (1) stack ID #20;
- (d) One (1) two component, elastomeric foam machine, identified as Unit ID #16, constructed in February 11, 1998, with a maximum production rate of 1731 pads per day, exhausting through one (1) stack ID #9;
- (e) One (1) automated hub assembly, identified as Unit ID #8, constructed in 1995, with a maximum usage rate of 1.33 pounds of adhesive per hour, exhausting through one (1) stack ID # 16;
- (f) One (1) fabric roller coater, identified as Unit ID #9, used for the application of sealant to hook fabric products, constructed on November 7, 1985, with a maximum usage rate of 5 pounds of water-based adhesive per hour, exhausting through two (2) stacks ID # 10 and 11;
- (g) One (1) Automated Compounding operation, identified as Unit #10, with a maximum usage

rate of 524 pounds of TDI per hour, exhausting through stack ID #8;

- (h) One (1) manual hub glueing station, identified as Unit ID #11, constructed in 1977, with a maximum usage rate of 1.33 pounds of adhesive per hour, exhausting through two (2) stacks ID #12 and 22;
- (i) The following fugitive emission source with individual HAP emissions below 1 ton per year and a combination of HAP emissions below 2.5 tons per year:
 - (1) Evaporation of the solvent carrier for the liquid mold release used on flexible and rigid foam molds, identified as unit #33;
- (j) One (1) natural gas-fired boiler for area heating, with a maximum heat input capacity of less than 1 million British thermal units (MMBtu) per hour, exhausting through stack #18;
- (k) A product line for manufacturing and coating urethane foam flowerpot containers, identified as Unit #17, exhausting through stack #21, consisting of the following units:
 - (1) One (1) high pressure elastometer spraying machine; and
 - (2) One (1) spray booth, for the application of urethane elastometer coating to the foam containers.
- (l) Two (2) cold cleaner degreasing tanks, identified as Unit # 18 and Unit # 19, using Methylene Chloride as solvent.
- (m) One (1) Foam Mixing Line to produce varieties of product, such as surgical face masks; and polyurethane foam furniture cushion, and automobile interior parts, etc. This line will consist of the following emission units:
 - (1) One (1) Large Part Conveyor Line, identified as Unit #20: Edge Sweets FM, with the maximum capacity of 277 carrier per shift;
 - (2) One (1) Large Part Conveyor Line, identified as Unit #21: KraussMaffei FM, with the maximum capacity of 277 carrier per shift; and
 - (3) One (1) Large Part Conveyor Line, identified as Unit #22: Spray Booth, with the maximum capacity of 540 carrier per shift, exhausting through stack ID #23.

Permitted Emission Units Removed from Service

The following emission units have been decommissioned and removed from the source:

- (a) One (1) two component, polyurethane Klockner foam machine, identified as Unit ID #13, constructed in 1995, with a maximum production rate of 3,873 pads per day, exhausting through one (1) stack ID #5.
- (b) One (1) two component, polyurethane foam machine, identified as Unit ID #15, constructed in 1998, with a maximum production rate of 624 pads per day, exhausting through one (1) stack ID # 23.
- (c) One (1) natural gas-fired boiler for area heating, with a maximum heat input capacity of less than 1 million British thermal units (MMBtu) per hour.

Unpermitted Emission Units and Pollution Control Equipment

There are no unpermitted facilities operating at this source during this review process.

New Emission Units and Pollution Control Equipment

The application includes information relating to the construction and operation of the following equipment:

- (a) Process line LPC-2 consisting of the following:
 - (1) Two (2) urethane foam machines, identified as Units #30 and #31, each with a maximum production rate of 19.0 and 210.6 pounds of urethane parts per hour, respectively, each exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #32, using a maximum of 4.64 pounds of

mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #28);

- (3) One (1) natural gas-fired drying oven, identified as Unit #34, with a maximum heat input capacity of 0.3 MMBtu per hour, exhausting through one (1) stack (Stack #29);
- (b) Process line LPC-3 consisting of the following:
 - (1) Two (2) urethane foam machines, identified as Units #35 and #36, with a total maximum production rate of 222.6 pounds of urethane parts per hour, each exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #37, using a maximum of 9.07 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #30);
 - (3) One (1) natural gas-fired drying oven, identified as Unit #38, with a maximum heat input capacity of 1.875 MMBtu per hour, exhausting through one (1) stack (Stack #31);
- (c) Process line LPC-4 consisting of the following:
 - (1) One (1) high pressure foam machine, identified as Unit #23, with a maximum production rate of 33.9 pounds of urethane parts per hour, exhausting inside the building;
 - (2) One (1) spray booth, identified as Unit #24, using a maximum of 3.15 pounds of mold release per hour, using an air atomization spray application system, with side baffles for overspray control, exhausting through one (1) stack (Stack #25).

Existing Approvals

The source has been operating under previous approvals including, but not limited to, the following:

- (a) R157-7640-00080, issued on October 5, 2001;
- (b) R157-16141-00080, issued on August 2, 2002;
- (c) R157-16438-00080, issued on April 10, 2003;
- (d) R157-17126-00080, issued on July 30, 2003; and
- (e) R157-17884-00080, issued on October 29, 2003.

All conditions from previous approvals were incorporated into this permit.

Enforcement Issue

On October 9, 2003, it was verified with the Office of Enforcement that the following issues have not been settled:

- (a) IDEM is aware that equipment has been constructed and operated prior to receipt of the original Registration No. 157-7640-00080. The subject equipment is listed in this Technical Support Document under the condition entitled Permitted Emission Units and Pollution Control Equipment (which were permitted in Registration No. 157-7640-00080). An enforcement referral was made in September, 2001.

IDEM is reviewing this matter and will take appropriate action. This proposed permit is intended to satisfy the requirements of the construction permit rules.

- (b) IDEM is also aware that before January 1, 2001, this source was subject to 326 IAC 2-7 (Part 70 Operating Permit Program) because the potential to emit (PTE) of a single hazardous air pollutant (HAP) was greater than 10 tons per year, and the PTE of any combination of HAPs was greater than 25 tons/year. An application for a Title V permit was submitted on December 13, 1996, which was amended on April 17, 1997. However, after January 1, 2001, the source changed to non-HAP solvents which made them a minor source of HAPs and no longer subject to 326 IAC 2-7.

- (c) IDEM is aware that prior to January 1, 2001, the date when the source changed solvents into non-HAP solvents which made them a minor source for HAPs, the foam machines were subject to the notification requirements of the National Emission Standards for Hazardous Air Pollutants (NESHAP), 326 IAC 14, 40 CFR 63.1290 through 63.1309, Subpart III (Flexible Polyurethane Foam Production) because the source (1) produces flexible polyurethane foam; (2) emits a HAP; and (3) the foam manufacturing process is located at a plant site that was a major source, as defined in 40 CFR 63.2 of subpart A. The applicable notification requirements are listed in 40 CFR 63.1306.

Stack Summary

Stack ID	Operation	Height (feet)	Diameter (feet)	Flow Rate (acfm)	Temperature (°F)
3	Compounding/Hood	12.0	0.83	650	70
4	Diskit Room B (Unit ID #5)	11.58	0.83	650	70
5	Diskit Room A (Unit ID #1)	12.0	0.83	650	70
7	Diskit Room A (Unit ID #2) and Diskit Room B (Unit #3)	11.58	0.83	650	70
8	Automated Compounding (Unit #10)	horizontal exiting at 12.5'	0.33	650	150
9	Unit ID #16	12.5	0.83	650	70
10	Fabric Roller Coater	12.13	0.83	650	70
11	Fabric Roller Coater	2.0	3.0	11,875	70
12	Unit ID #11	16.13	0.83	650	70
13	Unit ID #s 6 and 7	16.13	0.83	650	70
16	Air Compressor Room & Unit ID #8	16.17	3.0	14,600	70
18	Area Heating Boiler	18.0	0.83	1000	70
19	Unit ID #4	12.5	0.83	200	70
20	Diskit Room B (Unit ID #14)	11.58	0.83	650	70
21	Unit ID #17	26.0	2.5	8450	70
22	Unit ID #11	12.0	0.83	650	70
23	Unit #22	24.0	2.0	5200	70
25	Unit #24	18.0	2.0	650	80
28	Unit #32	18.0	2.0	650	80
29	Unit #34	18.0	2.0	650	80
30	Unit #37	18.0	2.0	650	80
31	Unit #38	18.0	2.0	650	80

Recommendation

The staff recommends to the Commissioner that the construction and operation be approved. This

recommendation is based on the following facts and conditions:

Unless otherwise stated, information used in this review was derived from the application and additional information submitted by the applicant.

An application for the purposes of this review was received on September 16, 2003, with additional information received on October 31, 2003.

Emission Calculations

See Appendix A of this document for detailed emissions calculations (6 pages).

Potential To Emit of Source Before Controls

Pursuant to 326 IAC 2-1.1-1(16), Potential to Emit is defined as "the maximum capacity of a stationary source or emissions unit to emit any air pollutant under its physical and operational design. Any physical or operational limitation on the capacity of a source to emit an air pollutant, including air pollution control equipment and restrictions on hours of operation or type or amount of material combusted, stored, or processed shall be treated as part of its design if the limitation is enforceable by the U. S. EPA, the department, or the appropriate local air pollution control agency."

Pollutant	Potential To Emit (tons/year)
PM	1.95
PM-10	2.00
SO ₂	0.01
VOC	89.21
CO	0.80
NO _x	0.95

HAP's	Potential To Emit (tons/year)
MDI	less than 10
TDI	less than 10
Toluene	less than 10
Methylene Chloride	less than 10
Hexane	less than 10
TOTAL	less than 25

- (a) The potential to emit (as defined in 326 IAC 2-7-1(29)) of pollutants are less than 100 tons per year. Therefore, the source is subject to the provisions of 326 IAC 2-6.1.
- (b) The potential to emit (as defined in 326 IAC 2-7-1(29)) of any single HAP is less than ten (10) tons per year and the potential to emit (as defined in 326 IAC 2-7-1(29)) of a combination of HAPs is less than twenty-five (25) tons per year. Therefore, the source is subject to the provisions of 326 IAC 2-6.1.
- (c) Fugitive Emissions
Since this type of operation is not one of the twenty-eight (28) listed source categories under 326 IAC 2-2 and since there are no applicable New Source Performance Standards that were in effect on August 7, 1980, the fugitive emissions are not counted toward determination of PSD and Emission Offset applicability.

County Attainment Status

The source is located in Tippecanoe County.

Pollutant	Status
PM-10	attainment
SO ₂	attainment
NO ₂	attainment
Ozone	attainment
CO	attainment
Lead	attainment

- (a) Volatile organic compounds (VOC) are precursors for the formation of ozone. Therefore, VOC emissions are considered when evaluating the rule applicability relating to the ozone standards. Tippecanoe County has been designated as attainment or unclassifiable for ozone. Therefore, VOC emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (b) Tippecanoe County has been classified as attainment or unclassifiable for all other criteria pollutants. Therefore, these emissions were reviewed pursuant to the requirements for Prevention of Significant Deterioration (PSD), 326 IAC 2-2.
- (c) Fugitive Emissions
Since this type of operation is not one of the 28 listed source categories under 326 IAC 2-2, 40 CFR 52.21, or 326 IAC 2-3 and since there are no applicable New Source Performance Standards that were in effect on August 7, 1980, the fugitive emissions are not counted toward determination of PSD and Emission Offset applicability.

Source Status

Existing Source PSD Definition (emissions after controls, based on 8,760 hours of operation per year at rated capacity and/ or as otherwise limited):

Pollutant	Emissions (ton/yr)
PM	0.33
PM10	0.33
SO ₂	negligible
VOC	18.0
CO	negligible
NO _x	0.0

- (a) This existing source is **not** a major stationary source because no attainment regulated pollutant is emitted at a rate of 250 tons per year or more, and it is not in one of the 28 listed source categories.
- (b) These emissions were based on Registration No. R157-17884-00080, issued to this source on October 29, 2003.

Proposed Modification

PTE from the proposed modification (based on 8,760 hours of operation per year at rated capacity including enforceable emission control and production limit, where applicable):

Pollutant	PM (ton/yr)	PM10 (ton/yr)	SO ₂ (ton/yr)	VOC (ton/yr)	CO (ton/yr)	NO _x (ton/yr)
Proposed Modification (Process Lines LPC-2, LPC-3, and LPC-4)	1.62	1.67	0.01	71.19	0.80	0.95
PSD Threshold Level	250	250	250	250	250	250

This modification to an existing minor stationary source is not major because the emission increase is less than the PSD significant levels. Therefore, pursuant to 326 IAC 2-2, the PSD requirements do not apply.

Part 70 Permit Determination

326 IAC 2-7 (Part 70 Permit Program)

This existing source, including the emissions from the new equipment covered under this permit MSOP-157-18141-00080, is still not subject to the Part 70 Permit requirements because the potential to emit (PTE) of:

- (a) each criteria pollutant is less than 100 tons per year,
- (b) a single hazardous air pollutant (HAP) is less than 10 tons per year, and
- (c) any combination of HAPs is less than 25 tons/year.

This status is based on all the air approvals issued to the source. This status has been verified by the OAQ inspector assigned to the source.

Federal Rule Applicability

- (a) New Source Performance Standards (NSPS)(326 IAC 12 and 40 CFR Part 60)
 - (1) 326 IAC 12, (40 CFR 60.740, Subpart VVV (Standards of Performance for Polymeric Coating of Supporting Substrates Facilities). The fabric roller coater, identified as Unit ID #9, is not subject to the requirements of the New Source Performance Standard, 326 IAC 12, 40 CFR 60.740, Subpart VVV (Standards of Performance for Polymeric Coating of Supporting Substrates Facilities) because it was constructed on November 7, 1985, which predates the applicability date of April 30, 1987.
 - (2) The polyurethane flowerpot coating unit is not subject to 40 CFR 60, Subpart VVV because it is used to apply a non-VOC coating.
 - (3) The one (1) boiler at this source is not subject to 40 CFR 60, Subpart Dc because the maximum capacity of the boiler is less than the 10 mmBtu/hr applicability threshold.
- (b) National Emission Standards for Hazardous Air Pollutants (NESHAP), 326 IAC 14 and 40 CFR Part 63

- (1) 40 CFR 63.1290 through 63.1309, Subpart III (Flexible Polyurethane Foam Production): This rule applies to any flexible polyurethane foam process that meets the following criteria: (1) produces flexible polyurethane foam; (2) emits a HAP; and (3) the foam manufacturing process is located at a plant site that is a major source, as defined in 40 CFR 63.2 of subpart A.

Pursuant to 40 CFR 63.1291, the compliance date for this NESHAP is October 8, 2001. As of January 1, 2001, the source replaced the clean up solvent in the foam machines to a non-HAP solvent making the source a minor source of HAP emissions. Therefore, upon issuance of registration no. 157-7640-00080 issued on October 5, 2001, the source was no longer subject to the requirements of this rule.

The foam machines, identified as Unit ID Nos. 1, 2, 3, 4, 5, 6, 7, 13, 14, 16; the Foam Mixing Units, identified as Unit ID Nos. 20, 21, and 22; and the foam machines in the new process lines LPC-2, LPC-3, and LPC-4, identified as Unit ID Nos. 30, 31, 35, 36, and 23, are not subject to the requirements of this NESHAP, as the source is a minor source of HAP emissions.

- (2) 40 CFR 63.3280 through 63.3420, Subpart JJJJ (Paper and Other Web Coating): This rule applies to each new and existing facility that is a major source of HAP, as defined in 40 CFR 63.2, at which web coating lines are operated. This source is not a major source of HAP, therefore, this rule does not apply to the fabric roller coater.
- (3) 40 CFR 63.460, Subpart T (Halogenated Solvent Cleaning): The solvent cleaning tanks use a solvent containing methylene chloride in a concentration greater than 5 percent by weight for batch cleaning of parts. Therefore, the two (2) cold cleaner degreaser tanks, identified as Unit ID Nos. 18 and 19, are subject to the requirements of this subpart. Pursuant to 40 CFR 63.462 (Batch Cold Cleaning Machine Standards):
- (A) Each owner or operator of an immersion batch cold solvent cleaning machine shall comply with the following:
 - (i) Employ a tightly fitting cover that shall be closed at all times except during parts entry and removal, and a water layer at a minimum thickness of 2.5 cm (1.0 inch) on the surface of the solvent within the cleaning machine, or
 - (ii) Employ a tightly fitting cover that shall be closed at all times except during parts entry and removal and a freeboard ratio of 0.75 or greater.
 - (B) Each owner or operator of a remote-reservoir batch cold solvent cleaning machine shall employ a tightly fitting cover over the solvent sump that shall be closed at all times except during the cleaning of parts.
 - (C) Each owner or operator of a batch cold cleaning machine shall comply with the work and operational practice requirements as follows:
 - (i) All waste solvent shall be collected and stored on closed containers. The closed container may contain a device that allows pressure relief, but does not allow liquid solvent to drain from the container.

- (ii) If a flexible hose or flushing device is used, flushing shall be performed only within the freeboard area of the solvent cleaning machine.
 - (iii) The owner or operator shall drain solvent cleaned parts for 15 seconds or until dripping has stopped, whichever is longer. Parts having cavities or blind holes shall be tipped or rotated while draining.
 - (iv) The owner or operator shall ensure that the solvent level does not exceed the fill line.
 - (v) Spills during solvent transfer shall be wiped up immediately. The wipe rags shall be stored in covered containers meeting the requirements of (C)(i) of this section.
 - (vi) When an air - or pump - agitated solvent bath is used, the owner or operator shall ensure that the agitator is operated to produce a rolling motion of the solvent but not observable splashing against tank walls or parts being cleaned.
 - (vii) The owner or operator shall ensure that, when the cover is open, the cold cleaning machine is not exposed to drafts greater than 40 meters per minute (132 feet per minute)0, as measured between 1 and 2 meters (3.3 and 6.6 feet) upwind and at the same elevation as the tank lip.
 - (viii) Except as provided in paragraph (C)(ix) of this section, sponges, fabric, wood, and paper products shall not be cleaned.
 - (ix) The prohibition in paragraph (C)(viii) of this section does not apply to the cleaning of porous materials that are parts of polychlorinated biphenyl (PCB) laden transformers if those transformers are handled throughout the cleaning process and disposed of in compliance with an approved PCB disposal permit issued in accordance with the Toxic Substances Control Act.
- (D) Each owner or operator shall submit an initial notification report as described in 40 CFR 63.468(a) (for existing machines) and (b) (for new machines) and a compliance report as described in 40 CFR 63.468(c). Pursuant to 40 CFR 63.468 (b):
- (i) Each owner or operator of a new solvent cleaning machine shall submit an initial notification report to the Administrator. New sources for which the construction or reconstruction commenced after December 2, 1994, shall submit this report as soon as practicable before the construction or reconstruction is planned to commence. This report shall include all of the information required in 40 CFR 63.5(d)(1) of Subpart A (General Provisions), with the revisions and additions in paragraphs (i)(a) through (i)(c) of this section.
 - (a) The report shall include a brief description of each solvent cleaning machine including machine type (batch vapor), batch cold, vapor in-line, or cold-line), solvent/air interface

- area, and existing controls.
 - (b) The report shall include the anticipated compliance approach for each solvent cleaning machine.
 - (c) In lieu of 40 CFR 63.5 (d)(1)(ii)(H) of subpart A of this part, the owner or operator must report an estimate of annual halogenated HAP solvent consumption for each solvent cleaning machine.
- (ii) Each owner or operator of a batch cold solvent cleaning machine subject to the provisions of this subpart shall submit a compliance report to the Administrator. For new sources, this report shall be submitted to the Administrator no later than 150 days after startup, or May 1, 1995, whichever is later. This report shall include the following requirements:
- (a) The name and address of the owner or operator.
 - (b) The address (i.e. physical location) of the solvent cleaning machine(s).
 - (c) A statement, signed by the owner or operator of the solvent cleaning machine, stating that the solvent cleaning machine for which the report is being submitted is in compliance with the provisions of this subpart.
 - (d) The compliance approach for each solvent cleaning machine.

State Rule Applicability - Entire Source

326 IAC 2-2 (Prevention of Significant Deterioration)

This source has potential emissions of all attainment regulated criteria pollutants of less than 250 tons per year and it is not in one of the 28 listed source categories, therefore, it is not a major source pursuant to this rule. The requirements of this rule do not apply.

326 IAC 2-6 (Emission Reporting)

This source is located in Tippecanoe County and the potential to emit PM₁₀, SO₂, VOC, CO, and NO_x is less than one hundred (100) tons per year. Therefore, 326 IAC 2-6 does not apply.

326 IAC 5-1 (Visible Emissions Limitations)

Pursuant to 326 IAC 5-1-2 (Opacity Limitations), except as provided in 326 IAC 5-1-3 (Temporary Exemptions), opacity shall meet the following, unless otherwise stated in this permit:

- (a) Opacity shall not exceed an average of forty percent (40%) any one (1) six (6) minute averaging period as determined in 326 IAC 5-1-4.
- (b) Opacity shall not exceed sixty percent (60%) for more than a cumulative total of fifteen (15) minutes (sixty (60) readings as measured according to 40 CFR 60, Appendix A, Method 9 or fifteen (15) one (1) minute nonoverlapping integrated averages for a continuous opacity monitor) in a six (6) hour period.

State Rule Applicability - Individual Facilities

326 IAC 2-4.1 (Major Sources of Hazardous Air Pollutants (HAP))

The seven (7) foam machines, identified as Unit ID Nos. 1 through 7, the automated hub assembly, and the manual hub gluing station, were each constructed prior to the July 27, 1997 compliance date for this rule, therefore, they are not subject to this rule. The operation of each of the other facilities at this source, including the foam mixing units, consisting of Line Nos. 20, 21 and 22, and the new equipment included in the process lines LPC-2, LPC-3, and LPC-4, each constructed after the compliance date, will emit less than 10 tons per year of a single HAP or 25 tons per year of a combination of HAPs. Therefore, 326 IAC 2-4.1 does not apply.

326 IAC 6-3 (Particulate Emission Limitations for Manufacturing Processes)

Pursuant to 326 IAC 6-3-1, this rule does not apply to manufacturing processes with potential particulate emissions less than 0.551 pound per hour. Each of the emission units at this source has potential particulate emissions of less than 0.551 pound per hour, therefore, this rule does not apply to any of the emission units at this source.

326 IAC 8-2 (Surface Coating Emissions Limitations)

The urethane flowerpot coating operation does not meet the definition of any of the coating operations included in this rule. Therefore, 326 IAC 8-2 does not apply to the flowerpot coating operation.

326 IAC 8-2-11 (Fabric and Vinyl Coating)

The fabric roller coater is not subject to the requirements of this rule because the unit was constructed on November 7, 1985, which predates the rule applicability date of July 1, 1990 and potential VOC emissions from the facility are less than 25 tons per year.

326 IAC 8-2-9 (Miscellaneous Metal Coating)

The three (3) spray booths in the new process lines LPC-2, LPC-3, and LPC-4, identified as Unit ID Nos. 32, 37, and 24, which apply mold release to metal molds, are not subject to the requirements of this rule because the SIC code for this source is 3089. This is not one of the SIC codes listed in the applicability section of 326 IAC 8-2-9. Therefore, this rule does not apply.

326 IAC 8-1-6 (New Facilities; General Reduction Requirements)

The ten (10) polyurethane foam machines, the automated hub assembly, the fabric roller coater, the automated compounding operation, the new foam mixing, elastomer spraying and coating units, the two (2) degreasing tanks, the manual hub glueing station, the foam mixing units, consisting of Line Nos. 20, 21 and 22, and the foam machines and spray booths in process lines LPC-2, LPC-3, and LPC-4, identified as Unit ID Nos. 30, 31, 32, 35, 36, 23, and 24, are not subject to the requirements of 326 IAC 8-1-6 (New Facilities; General Reduction Requirements) because each of these facilities have potential VOC emissions of less than 25 tons per year.

The one (1) spray booth in the process line LPC-3, identified as Unit ID No. 37 has potential VOC emissions of greater than 25 tons per year. The input of VOC to the spray booth, identified as Unit ID No. 37, shall be limited to less than 25 tons per twelve (12) consecutive month period, with compliance determined at the end of each month, so that the requirements of this rule do not apply to spray booth, identified as Unit ID No. 37.

326 IAC 8-3-2 and 8-3-5 (Organic Solvent Degreasing Operations: Cold Cleaner Degreasers)

The two (2) degreasing operations at the source have emissions of less than 15 pounds per day. Therefore, pursuant to 326 IAC 8-1-1(b), these units are not subject to the requirements of 326 IAC 8-3-2 and 326 IAC 8-3-5.

326 IAC 6-2-4 (Particulate Emission Limitations for Sources of Indirect Heating)

The one (1) boiler, constructed after September 21, 1983, is subject to this rule. The particulate

emissions from the one (1) boiler is limited by the following equation:

$$Pt = 1.09/Q^{0.26}$$

Where:

Pt = Pounds of particulate matter per million Btu (lb/mmBtu) heat input.

Q = Total source maximum operating capacity rating in million Btu per hour (mmBtu/hr) heat input = 1 mmBtu/hr

$$\begin{aligned}\text{Therefore, Pt} &= 1.09/1^{0.26} \\ &= 1.09 \text{ lb/mmBtu}\end{aligned}$$

Pursuant to 326 IAC 6-2-4(a), for Q less than 10 mmBtu/hr, Pt shall not exceed 0.6. Therefore, the allowable particulate matter emissions from the boiler shall not exceed 0.6 lb/mmBtu. The potential to emit of the boiler is less than 0.6 lb/mmBtu. Therefore, the boiler is in compliance with 326 IAC 6-2-4.

The new drying ovens in the LPC-2 and LPC-3 process lines are not indirect heating sources, therefore, they are not subject to this rule.

Conclusion

The construction and operation of this flexible polyurethane foam casting plant shall be subject to the conditions of the attached proposed **New Source Construction and Minor Source Operating Permit 157-18141-00080**.

Appendix A: Emission Calculations Summary

Company Name: Perry Chemical & Manufacturing Company, Inc.
Address City IN Zip: 2335 South 30th Street, Lafayette, Indiana 47903-6419
MSOP No.: 157-18141
Plt ID: 157-00080
Reviewer: Trish Earls/EVP
Date: 10/07/03

Uncontrolled Potential Emissions (tons/year)**Emissions Generating Activity**

Pollutant	Foam Machines and Compounding	Various Processes	Surface Coating	Two Degreasers*	Foam Mixing Line Units #20, #21, #22*	Natural Gas Combustion	TOTAL
PM	0.00	0.00	1.93	0.00	0.00	0.02	1.95
PM10	0.00	0.00	1.93	0.00	0.00	0.07	2.00
SO2	0.00	0.00	0.00	0.00	0.00	0.01	0.01
NOx	0.00	0.00	0.00	0.00	0.00	0.95	0.95
VOC	3.85	6.26	71.10	0.00	7.95	0.05	89.21
CO	0.00	0.00	0.00	0.00	0.00	0.80	0.80
total HAPs	0.12	2.54	0.00	5.80	5.4E-03	0.02	8.49
worst case single HAP	(TDI) 0.11	(Toluene) 2.54	0.00	(Meth. Chloride) 5.80	(MDI) 5.4E-03	(Hexane) 0.02	(Meth. Chloride) 5.80

Total emissions based on rated capacity at 8,760 hours/year.

* Emissions from degreasers and foam mixing line are from Registration No. R157-17884-00080, issued on October 29, 2003.

Controlled Potential Emissions (tons/year)**Emissions Generating Activity**

Pollutant	Foam Machines and Compounding	Various Processes	Surface Coating	Two Degreasers*	Foam Mixing Line Units #20, #21, #22*	Natural Gas Combustion	TOTAL
PM	0.00	0.00	1.39	0.00	0.00	0.02	1.41
PM10	0.00	0.00	1.39	0.00	0.00	0.07	1.46
SO2	0.00	0.00	0.00	0.00	0.00	0.01	0.01
NOx	0.00	0.00	0.00	0.00	0.00	0.95	0.95
VOC	3.85	6.26	57.36	0.00	7.95	0.05	75.47
CO	0.00	0.00	0.00	0.00	0.00	0.80	0.80
total HAPs	0.12	2.54	0.00	5.80	5.4E-03	0.02	8.49
worst case single HAP	(TDI) 0.11	(Toluene) 2.54	0.00	(Meth. Chloride) 5.80	(MDI) 5.4E-03	(Hexane) 0.02	(Meth. Chloride) 5.80

Total emissions based on rated capacity at 8,760 hours/year, after control.

Appendix A: Emission Calculations
VOC and HAP Emissions from Foam Machines

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Company Name: Perry Chemical & Manufacturing Company, Inc.
Address City IN Zip: 2335 South 30th Street, Lafayette, Indiana 47903-6419
MSOP No.: 157-18141
Plt ID: 157-00080
Reviewer: Trish Earls/EVP
Date: 10/07/03

Process	Pollutant	Maximum Usage (lb/hr)	* Emission Factor (lb/lb)	Emission Rate (lb/hour)	Uncontrolled Emissions (tons/year)
Foam Machines #1, 7, 4, 6, & 8 Unit ID #'s 1, 2, 3, 4, & 5	2,4 Toluene Diisocyanate (TDI)	3.87	5.0E-05	1.94E-04	8.48E-04
	2,6 Toluene Diisocyanate	2.09	5.0E-05	1.05E-04	4.58E-04
	Clean Up Solvents				
	n-methyl pyrrolidine	11.79	0.007	0.08	0.36
	Dimethyl glutarate	3.66	0.007	0.03	0.11
	Dimethyl adipate	1.63	0.007	0.01	0.05
	Dimethyl succinate	1.63	0.007	0.01	0.05
Foam Machines #2, 5 Unit ID #'s 6, 7	2,4 Toluene Diisocyanate (TDI)	0.10	5.0E-05	5.00E-06	2.19E-05
	2,6 Toluene Diisocyanate	0.05	5.0E-05	2.70E-06	1.18E-05
	Clean Up Solvents				
	n-methyl pyrrolidine	0.31	0.007	0.00	0.01
	Dimethyl glutarate	0.10	0.007	0.00	0.00
	Dimethyl adipate	0.04	0.007	0.00	0.00
	Dimethyl succinate	0.04	0.007	0.00	0.00
Foam Machine #3 Unit ID # 14	2,4 Toluene Diisocyanate (TDI)	3.87	5.0E-05	1.94E-04	8.48E-04
	2,6 Toluene Diisocyanate	2.09	5.0E-05	1.05E-04	4.58E-04
	Clean Up Solvents				
	n-methyl pyrrolidine	11.79	0.007	0.08	0.36
	Dimethyl glutarate	3.66	0.007	0.03	0.11
	Dimethyl adipate	1.63	0.007	0.01	0.05
	Dimethyl succinate	1.63	0.007	0.01	0.05
Foam Machine #9 Unit ID # 16	Methylene bis Diisocyanate (MDI)	23.49	3.15E-09	7.40E-08	3.24E-07
	Clean Up Solvents				
	n-methyl pyrrolidine	5.26	0.007	0.04	0.16
	Dimethyl glutarate	1.63	0.007	0.01	0.05
	Dimethyl adipate	0.73	0.007	0.01	0.02
	Dimethyl succinate	0.73	0.007	0.01	0.02
Foam Machine #30 Unit ID # 30	Methylene bis Diisocyanate (MDI)	8.06	3.15E-09	2.54E-08	1.11E-07
Foam Machine #31 Unit ID # 31	Methylene bis Diisocyanate (MDI)	93.61	3.15E-09	2.95E-07	1.29E-06
Foam Machine #35 Unit ID # 35	Methylene bis Diisocyanate (MDI)	37.11	3.15E-09	1.17E-07	5.12E-07
Foam Machine #36 Unit ID # 36	Methylene bis Diisocyanate (MDI)	37.11	3.15E-09	1.17E-07	5.12E-07
Foam Machine #23 Unit ID # 23	Methylene bis Diisocyanate (MDI)	11.29	3.15E-09	3.56E-08	1.56E-07
Automated Compounding Unit ID #10	2,4 Toluene Diisocyanate (TDI)	524.00	5.0E-05	0.03	0.11
TOTAL VOC EMISSIONS				0.88	3.85
TOTAL HAP EMISSIONS				2.66E-02	0.12

Methodology:

MDI emission factor was taken from the US EPA website, it has been determined that testing is not necessary to verify this factor, like the fiberglass emission factors.

Solvent emission factor was verified through stack tests on April 8, 2002 and validated by Compliance Data Section.

Maximum production rates are for each machine.

Emission Rate (lb/hour) = Maximum Production (lb/day) * Emission Factor (lb/lb) * (1 day/ actual operating hours)

Uncontrolled Emissions (tons/year) = Emission Rate (lb/hour) * (1 ton/2000 lb) * (8760 hour/1 year)

There are no VOC or HAP emissions from the amine based catalyst usage.

Appendix A: Emission Calculations
VOC and HAP Emissions from Various Processes

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Company Name: Perry Chemical & Manufacturing Company, Inc.
Address City IN Zip: 2335 South 30th Street, Lafayette, Indiana 47903-6419
MSOP No.: 157-18141
Plt ID: 157-00080
Reviewer: Trish Earls/EVP
Date: 10/07/03

Process	Pollutant	Maximum Usage (lb/hr)	Emission Rate (lb/hour)	Uncontrolled Emissions (tons/year)
Automated Hub Assembly Unit ID #8				
	Textile Spirits	0.33	0.33	1.45
	Toluene	0.29	0.29	1.27
	Acetone	0.33	0.33	1.45
Manual Hub Glueing Unit ID #11				
	Textile Spirits	0.33	0.33	1.45
	Toluene	0.29	0.29	1.27
	Acetone	0.33	0.33	1.45
Fabric Coater Unit ID #9	Water-based adhesive			
	1-Methyl-2-pyrrolidinone	0.15	0.15	0.66
Fugitive Source ID #33 Molds and equipment coated with liquid wax	Hydrocarbon Naphtha	0.04	0.04	0.17
	VM&P Naphtha	2.00E-03	0.00	0.01
TOTAL VOC EMISSIONS			1.43	6.26
TOTAL HAP EMISSIONS			0.58	2.54

Note: (1) Acetone is not a VOC or a HAP, therefore, acetone emissions were not included in the total VOC/HAP emissions.
(2) Fabric coater emissions are based on usage of a water-based coating which is 55% water, 42-43% polyurethane, and 2-3% 1-Methyl-2-Pyrrolidinone. Coating usage is based on the measured evaporation rate from experimental data.

Methodology:

Uncontrolled Emissions (tons/year) = Maximum Usage (lb/hour) * (1 ton/2000 lb) * (8760 hour/1 year)

**Appendix A: Emissions Calculations
VOC and Particulate
From Surface Coating Operations**

Company Name: Perry Chemical & Manufacturing Company, Inc.
Address City IN Zip: 2335 South 30th Street, Lafayette, Indiana 47903-6419
MSOP No.: 157-18141
Pit ID: 157-00080
Reviewer: Trish Earls/EVP
Date: 10/07/03

Emission Unit ID	Material	Density (Lb/Gal)	Weight % Volatile (H2O & Organics)	Weight % Water	Weight % Organics	Volume % Water	Volume % Non-Volatiles (solids)	Gal of Mat. (gal/unit)	Maximum (unit/hour)	Pounds VOC per gallon of coating less water	Pounds VOC per gallon of coating	Potential VOC pounds per hour	Potential VOC pounds per day	Potential VOC tons per year	Particulate Potential (ton/yr)	lb VOC/gal solids	Transfer Efficiency
Flowerpot Surface Coating																	
Unit #17	BSP-331W	8.30	70.00%	70.0%	0.0%	70.0%	30.00%	0.02000	6.000	0.00	0.00	0.00	0.00	0.00	0.33	0.00	75%
Mold Release Surface Coating																	
Unit #32	Mold Release	6.58	97.00%	0.0%	97.0%	0.0%	3.00%	0.00340	210.000	6.38	6.38	4.56	109.37	19.96	0.31	212.75	50%
Unit #37	Mold Release	6.58	97.00%	0.0%	97.0%	0.0%	3.00%	0.00510	271.000	6.38	6.38	8.82	211.71	38.64	0.60	212.75	50%
Unit #24	Mold Release	6.41	90.00%	0.0%	90.0%	0.0%	10.00%	0.00582	85.000	5.77	5.77	2.85	68.49	12.50	0.69	57.69	50%

State Potential Emissions	Add worst case coating to all solvents	16.23	389.58	71.10	1.93
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Material Usage Limitation for Unit #37	Control Efficiency	Controlled VOC lbs per Hour	Controlled VOC lbs per Day	Controlled VOC tons per Year	Controlled PM tons/yr
VOC	PM				
64.44%	0.00%	13.10	314.30	57.36	1.39

Note: VOC emissions from Unit #37 are limited to less than 25 tons/yr to render 326 IAC 8-1-6 (BACT) not applicable.

METHODOLOGY

Pounds of VOC per Gallon Coating less Water = (Density (lb/gal) * Weight % Organics) / (1-Volume % water)
Pounds of VOC per Gallon Coating = (Density (lb/gal) * Weight % Organics)
Potential VOC Pounds per Hour = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr)
Potential VOC Pounds per Day = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (24 hr/day)
Potential VOC Tons per Year = Pounds of VOC per Gallon coating (lb/gal) * Gal of Material (gal/unit) * Maximum (units/hr) * (8760 hr/yr) * (1 ton/2000 lbs)
Particulate Potential Tons per Year = (units/hour) * (gal/unit) * (lbs/gal) * (1- Weight % Volatiles) * (1-Transfer efficiency) *(8760 hrs/yr) *(1 ton/2000 lbs)
Pounds VOC per Gallon of Solids = (Density (lbs/gal) * Weight % organics) / (Volume % solids)

**Appendix A: Emission Calculations
Foam Mixing Line**

Company Name: Perry Chemical & Manufacturing Company, Inc.
Address City IN Zip: 2335 South 30th Street, Lafayette, Indiana 47903-6419
MSOP No.: 157-18141
Plt ID: 157-00080
Reviewer: Trish Earls/EVP
Date: 10/07/03

Material	Mold/Carrier	Carrier/shift	Mat'l Usage lb/carr/shift	Percent VOC	Percent HAP	Mat'l Usage lbs/hr	Em. Factor lb/lb	HAP Emissions ton/yr	VOC Emissions tons/yr
Large Part Conveyor Line - Unit #20: Edge Sweets FM									
MDI	0.33	270	5.5	100.00%	100.00%	20.58	5.00E-05	4.51E-03	4.51E-03
Catalyst	0.33	277	5.5	0.00%	0.00%	41.9	0	0.00	0.00
Large Part Conveyor Line - Unit #21: KraussMaffei FM									
MDI	0.66	270	0.75	100.00%	100.00%	4.2	5.00E-05	9.20E-04	9.20E-04
Catalyst	0.66	277	0.75	0.00%	0.00%	12.9	0	0.00	0.00
Large Part Conveyor Line - Unit #22: Spray Booth									
Mold Release	1	540	0.0277	97.00%	0.00%	1.87	1.0	0.00	7.94
Total Emissions								5.43E-03	7.95

Appendix A: Emissions Calculations
Natural Gas Combustion Only
MM BTU/HR <100
Drying Ovens

Company Name: Perry Chemical & Manufacturing Company, Inc.
Address City IN Zip: 2335 South 30th Street, Lafayette, Indiana 47903-6419
MSOP No.: 157-18141
Pit ID: 157-00080
Reviewer: Trish Earls/EVP
Date: 10/07/03

Heat Input Capacity
MMBtu/hr

Potential Throughput
MMCF/yr

2.2

19.1

	Pollutant					
Emission Factor in lb/MMCF	PM* 1.9	PM10* 7.6	SO2 0.6	NOx 100.0 **see below	VOC 5.5	CO 84.0
Potential Emission in tons/yr	0.02	0.07	0.01	0.95	0.05	0.80

*PM emission factor is filterable PM only. PM10 emission factor is filterable and condensable PM10 combined.

**Emission Factors for NOx: Uncontrolled = 100, Low NOx Burner = 50, Low NOx Burners/Flue gas recirculation = 32

Methodology

All emission factors are based on normal firing.

MMBtu = 1,000,000 Btu

MMCF = 1,000,000 Cubic Feet of Gas

Potential Throughput (MMCF) = Heat Input Capacity (MMBtu/hr) x 8,760 hrs/yr x 1 MMCF/1,000 MMBtu

Emission Factors are from AP 42, Chapter 1.4, Tables 1.4-1, 1.4-2, 1.4-3, SCC #1-02-006-02, 1-01-006-02, 1-03-006-02, and 1-03-006-03 (SUPPLEMENT D 3/98)

Emission (tons/yr) = Throughput (MMCF/yr) x Emission Factor (lb/MMCF)/2,000 lb/ton

See page 6 for HAPs emissions calculations.

Appendix A: Emissions Calculations**Natural Gas Combustion Only****MM BTU/HR <100****Drying Ovens****HAPs Emissions**

Company Name: Perry Chemical & Manufacturing Company, Inc.
Address City IN Zip: 2335 South 30th Street, Lafayette, Indiana 47903-6419
MSOP No.: 157-18141
Plt ID: 157-00080
Reviewer: Trish Earls/EVP
Date: 10/07/03

	HAPs - Organics				
Emission Factor in lb/MMcf	Benzene 2.1E-03	Dichlorobenzene 1.2E-03	Formaldehyde 7.5E-02	Hexane 1.8E+00	Toluene 3.4E-03
Potential Emission in tons/yr	2.001E-05	1.143E-05	7.145E-04	1.715E-02	3.239E-05

	HAPs - Metals				
Emission Factor in lb/MMcf	Lead 5.0E-04	Cadmium 1.1E-03	Chromium 1.4E-03	Manganese 3.8E-04	Nickel 2.1E-03
Potential Emission in tons/yr	4.763E-06	1.048E-05	1.334E-05	3.620E-06	2.001E-05

Methodology is the same as page 5.

The five highest organic and metal HAPs emission factors are provided above.
Additional HAPs emission factors are available in AP-42, Chapter 1.4.